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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/091,977	03/06/2002	Xiaobao X Chen	21	6368

7590 08/11/2004

Docket Administrator (Room 3J-219)
Lucent Technologies Inc.
101 Crawfords Corner Road
Holmdel, NJ 07733-3030

EXAMINER

NGUYEN, THUAN T

ART UNIT	PAPER NUMBER
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2685

DATE MAILED: 08/11/2004

4

Please find below and/or attached an Office communication concerning this application or proceeding.



**UNITED STATES DEPARTMENT OF COMMERCE
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Commissioner of Patents and Trademarks

Office Action Summary

Application No.

10/091,977

Applicant(s)

CHEN, XIAOBAO X

Examiner

THUAN T. NGUYEN

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-7 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-7 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. ____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date 2.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. ____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: ____.

DETAILED ACTION

Claim Rejections - 35 USC 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

*A person shall be entitled to a patent unless --
(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.*

2. Claims 1-7 are rejected under 35 U.S.C. 102(e) as being anticipated by Boudreaux (U.S. Patent No. 6,466,556 B1).

Regarding claim 1, Boudreaux discloses "a Terrestrial Radio Access Network for the Universal Mobile Telephone System (UTRAN) comprising at least one first Radio Network Controller and at least one Node B associated with said first Controller across a lub interface, said first Controller and said Node B operating Internet Protocol, comprising, when there is a requirement for signaling and/or data traffic to cross the lub interface, the first Radio Network Controller is arranged to set up at least one IP tunnel across the lub interface and signaling and data information are encapsulated in IP packets", i.e., Fig. 1A discloses a UTRAN network 135 with radio network controllers 152-154 and Node Bs 160-164 and a lub interface LUB or LU134, (col. 4/line 57-col. 6/line 5) and data packets including signaling and/or data traffic are crossing the lub interface in IP packets (col. 1/lines 30-60 for TCP/IP protocols and GSM/GPRS and UMTS backbone for packet data addressed; and col. 4/lines 22-48 & col. 6/line 53-col. 7/line 65 for GTP protocol as General Packet Radio Service Tunneling Protocol for IP packets).

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As for claim 2, in further view of claim 1 above, Boudreaux discloses "when there is a requirement for signaling and/or data traffic to cross the *lur* interface, the first and the further Radio Network Controllers are arranged to set up at least one IP tunnel across the *lur* interface, and signaling and data information are encapsulated in IP packets", i.e., if a handover or a channel establishment occurs between the RNC and nodes, the RNC Controller uses the GTP tunnel protocol for setting up at least one IP tunnel across the ***lur* interface** (Figs. 3-6 & 7, and col. 5/line 38 to col. 6/line 59 for RAB or radio resource bearer for channel connection within the UTRAN 135 and ***lur* interface 134 or 136**).

As for claims 3-4, in view of claim 1, Boudreaux discloses "in which each IP tunnel carries at least one of the transport channels of the Universal Mobile Telephone System" and "in which the IP tunnel carries at least two transport channels which are multiplexed" (col. 3/lines 30-63 for multiple networks are involved and SS7 packet switching network and ATM switching as well as Time Division Multiplexing TDM for handling plurality of transport channels and multiplexing).

As for claim 5, in view of claim 4, Boudreaux further suggests "in which spare bits after the transmission of the Session Data Unit length in the data frame of each IP packet are arranged to carry the identity of at least two transport channels", i.e., radio access bearers handles this feature for identifying the traffic channels to MAC layer and Radio Link Physical Layer (col. 6/lines 11-25).

As for claim 6, in view of claim 4, Boudreaux inherently suggests "in which a one byte field in the common header structure of the channel frames is allocated to carry the identity of the at least two transport channels", i.e., packet data is known for containing common header structure to carry identifiers of traffic channels for provisions of retransmission and error

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correction (col. 6/lines 26-52; and col. 4/lines 22-56 for lu reference points for IP transport protocol stack).

As for claim 7, in view of claim 3, Boudreaux further addresses "in which each IP tunnel is dedicated to a specific transport channel", i.e., a dedicated traffic channel is assigned as RNS chooses appropriate radio resources for carrying out the channel connection (col. 6/line 53 to col. 7/line 26).

Conclusion

3. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure:

Soininen et al. (US Pub 2002/0049059 A1), Ahmavaara (US Pub 2004/0068571 A1), and Helander et al. (US Patent 6,735,187 B1) disclose UTRAN systems and related IP tunnel technique.

4. **Any response to this action should be mailed to:**

Commissioner of Patents and Trademarks

Washington, D.C. 20231

or faxed to:

(703) 872-9306, (for Technology Center 2600 only)


Hand-delivered responses should be brought to Crystal Park II,

2121 Crystal Drive, Arlington. VA., Sixth Floor (Receptionist).

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5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Tony Thuan Nguyen whose telephone number is (703) 308-5860. The examiner can normally be reached on Monday-Friday from 9:30 AM to 7:00 PM, with alternate Fridays off.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the **Technology Center 2600 Customer Service Office** whose telephone number is (703) 306-0377.



TONY T. NGUYEN
PATENT EXAMINER, TSA

Tony T. Nguyen
Art Unit 2685
August 4, 2004